CLEAN ENERGY COUNCIL

ENHANCING POSITIVE SOCIAL OUTCOMES FROM WIND FARM DEVELOPMENT

Evaluating community engagement and benefit-sharing in Australia

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ABOUT THIS REPORT

This research report was supported by the Clean Energy Council and a number of its members to provide a 'snapshot' of current community engagement and benefit-sharing practices in Australian wind farms. It provides an evidence base and recommendations for improving social outcomes from wind development for communities, regulators and developers.

THIS RESEARCH REPORT WAS MADE POSSIBLE BY FUNDING PROVIDED BY THE CLEAN ENERGY COUNCIL AND THE FOLLOWING MEMBERS:

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EXECUTIVE SUMMARY

The wind industry is positioned to contribute significantly to a clean energy future in Australia. However, a lack of strong community support has sometimes led to unviable projects, the introduction of stringent policies for wind development and an uncertain market for renewable generation. Social acceptance is considered crucial to the expansion of renewable energy and the ongoing viability of the wind industry in Australia.

A proportion of this lack of community support can be attributed, among other aspects, to ineffective processes for community engagement (processes used with community members to guide the development of a wind farm project) and a lack of benefit-sharing that is perceived as fair (the distribution of financial and other benefits with the community).

This research report, Enhancing Positive Social Outcomes from Wind Farm Development, was supported by the Clean Energy Council and aims to provide a 'snapshot' of current community engagement and benefit-sharing practices in Australian wind farms. It provides an evidence base and recommendations for improving social outcomes from wind development for communities, regulators and developers. Four source documents were created as part of this project: a literature review of 57 publications; 22 in-depth interviews; an online survey of 26 wind industry representatives and analysis of 32 Community Engagement Plans from the wind industry. This research report collates and summarises the findings of these four reports, from which the recommendations are elicited.

This report is presented within the context of a complex operating environment for wind development in Australia – one that is highly contingent on local and policy context, resourcing and individual and company capacities and attitudes to community engagement. Wind developer staff on-ground in communities are seeking to undertake meaningful engagement, while needing to meet a range of requirements associated with the commercial realities of developing large infrastructure projects. Despite this complexity, a shift has begun in the Australian wind industry towards valuing and practicing better community engagement and benefit-sharing. Initiatives that have assisted to 'change the game' include the ACT Government's Renewable Energy Reverse Auctions (since 2015), which required community engagement as an assessment criteria. Such initiatives have helped to attune investors to community acceptance issues, and increase the likelihood of power purchase agreements only being signed where there is evidence of positive social outcomes.

An overarching finding from this research is that each community engagement and benefit-sharing initiative should be tailored to a community's needs and expectations, and be built on face-to-face engagement carried out by suitably experienced and/or qualified practitioners able to build strong relationships between local people and the developer. This was found to be more important than using any particular methods, such as community consultative committees, neighbour payments or grant funds. This indicates that there is no single 'silver-bullet' approach that is guaranteed to create positive social outcomes. Rather, better practice requires moving away from one-size-fits-all approaches, and considering each community as its own context – with its own challenges and opportunities.

In terms of community engagement practices, this research found that long-term, local and face-to-face engagement yields the greatest positive outcomes from community engagement. This requires investing in community engagement practices and on-the-ground staff who are able to build relationships and trust. The current status of community engagement in Australian wind farms is that engagement generally starts early (during site feasibility studies) and uses a range of techniques, demonstrating a commitment to being adaptable and responsive to local context. Wind developers generally rely heavily on one-on-one methods and one-way communications, and relatively little on group-based engagement, opportunities for discussion and deliberation and experiential learning (e.g. at wind farm events and tours). Opportunities are often provided for communities to influence aspects of the wind farm design; however, there remains scope for developers to identify more areas where communities can have meaningful input. There is currently a lack of engagement during the construction phase and periods of project hiatus, and this is identified as a gap in current practice. In addition, there is also a lack of specific community-engagement skills and qualifications among community-engagement staff.

In terms of benefit-sharing in Australia, the wind industry has begun to implement approaches such as community grant funds, neighbour payments and co-ownership or co-investment to increase positive local impacts from the planned wind farm. Neighbourhood benefits and community funds are becoming increasingly widely adopted, and co-ownership and co-investment by communities is emerging. Benefit-sharing takes many forms, such as the use of local contractors, energy efficiency and education programs, contributions to local infrastructure, re-vegetation and local partnerships. Wind industry representatives have noted that benefit-sharing can shift the dynamics in the community towards active support for the wind farm, and also reduce project costs overall.

Community engagement and benefit-sharing efforts have been supported by the publication of industry guides – notably the Clean Energy Council's Community Engagement Guidelines for the Australian Wind Industry (2013) and the ACT Government's Best Practice Community Engagement in Wind Development (2014). These guides have been referred to as useful tools to inform practice and set a standard. Many wind companies' Community Engagement Plans have derived their information from these guides.

This research report provides specific findings regarding aspects of community engagement and of benefit-sharing practices that emerged from the four source documents

This includes the value of trust, the role of specific wind industry staff, the contribution of face-to-face engagement to relationship-building and the various models of financial and other benefits provided to hosts, wind farm neighbours and the broader community.

The first version of the findings were compiled into a discussion paper and the detailed recommendations were considered by a variety of stakeholders involved in wind development. This second version is published as a research report and features the revised recommendations supported by 16 panellists and one advisor to the project.

GENERAL RECOMMENDATIONS

DEVELOP COMMUNITY ENGAGEMENT THAT IS DIVERSE AND LONG-TERM

Community engagement approaches should include a diversity of practices sustained over time throughout the life of the development, and feature staff who are based in the community (ideally existing locals who are recognised and respected in the communities and upskilled in community engagement). Diversity of practices should include one-way and two-way communications in individual and group settings, as well as formal (e.g. meetings) and informal (e.g. stalls, celebrations) interactions. Invest in face-to-face time and build relationships in the local community as much as possible.

ENSURE INPUT AND OUTPUT COMMUNICATION MECHANISMS

Community engagement should involve ways for community input to influence decision-making and ways for outcomes to be reported back to communities. Community engagement can be considered as involving relationship building, information and education, input and feedback. Consider engagement as a process of responsiveness in which the community provides advice on a range of developer-approved options and topics that contributes to the value of the project by creating a more locally-appropriate and supported project. In turn, development approval is likely to be more achievable and social licence stronger and more sustained. Involve community leaders who can identify the best ways to engage with their community. Maintain one-on-one engagement to establish trusted communication, and ensure regular mail-outs with project updates to ensure accurate information for all.

RECOMMENDATIONS FOR WIND DEVELOPERS

INVEST ADEQUATELY IN COMMUNITY ENGAGEMENT

Recognise the resources it takes to undertake constructive community engagement, including both staff time and community engagement budgets. Consider how the staff undertaking engagement are positioned within the company and ensure these staff have capacity to make (at least some) decisions or, at least have direct access to decision-makers. Implement processes for developing detailed knowledge of the local context, including attention to culture, demographics, history and landscape values. Engage with both potential hosts and neighbours in one-on-one and group settings from the project feasibility stage. Consider implementing this recommendation through activities such as hiring community engagement staff from the community or, if this is not feasible, ensuring that the developers have a visible, accessible and ongoing (rather than intermittent) presence in the community.

PROVIDE COMMUNITY ENGAGEMENT TRAINING TO STAFF

Ensure staff are trained in community engagement theory, techniques and approaches, and follow-up mentoring. This includes skills such as active listening, negotiation, non-violent communication, community development and dispute resolution.

BECOME A LONG-TERM PART OF THE COMMUNITY

Provide ongoing opportunities for exposure, learning and opportunities for people to have contact with the wind technology and staff of the wind farm (e.g. tours, open days, celebrations, school programs, stalls, shopfronts), both pre-construction and during operations. Consider the long-term contribution the development can make in a local area and how this can enhance existing sources of identity and pride for local people (e.g. scholarships, using the community grant fund for both smaller projects and larger, ongoing projects). Be attentive to community engagement during periods of hiatus/delays and construction, as these can cause uncertainty, concern and disturbance for locals.

ENCOURAGE ONGOING ENGAGEMENT

Include community engagement components during construction within EPC (engineering, procurement and construction) contracts.

CLARIFY AND SEEK APPROVAL FOR ASPECTS AVAILABLE FOR COMMUNITY INPUT AND NEGOTIATION

Identify the options and decisions that are available for community input and ensure decision makers (e.g. senior managers) have pre-approved these aspects before seeking the community input. This could include seeking community input into the design and evaluation of the community engagement, and into the options available for benefit-sharing plans.

DIVERSIFY THE OPTIONS TO SHARE BENEFITS

To provide a sense of community ownership and control, provide possible benefit-sharing options to the community, and allow the community (e.g. via a representative body) to select their preferred option/s. Ensure the package of benefit-sharing mechanisms reaches the range of important local stakeholders, including neighbours. Implement evaluation practices for benefit-sharing, and involve the local community in this evaluation process.

SET A CONSISTENT COMPANY APPROACH TO BENEFIT-SHARING

As a company, set a transparent approach to benefit-sharing that can guide locally-appropriate applications. For example, establish a method for consulting on the benefit-sharing package, set a means of calculating a monetary contribution and outline the range of options through which such benefits could be shared (e.g. community funds, neighbour payments etc.). Ensure this is aligned and integrated with the community engagement plan and that the approach is flexible to local context.

BE COGNISANT OF 'FREE-RIDING'

Recognise the role that advocacy organisations and development practitioners play within communities, but do not misuse the social licence that they have established. Do not rely on other developers' contributions to building a strong social licence for wind energy.

RECOMMENDATIONS FOR REGULATORS

SHARE SUCCESS (AND OTHER) EXPERIENCES

Provide support and encouragement for industry to learn from each other regarding what is working effectively – and what is not.

COMMUNICATE CLEARLY

Provide clear, neutral and consistent messaging around wind energy technology – including wording in standards, processes, policy and regulation.

PRIORITISE POSITIVE SOCIAL OUTCOMES

Where local, state and federal governments are implementing renewable energy policies (e.g. reverse auctions) or power purchase agreements, include positive social contributions as assessment criteria. Such contributions could consider the local economy and industry, the future welfare of the community and the contribution of energy generation choices to global processes, particularly climate change. It would also consider local support for the wind farm.

PROVIDE (OR SUPPORT THE DEVELOPMENT OF) STATE AND/OR NATIONAL ONLINE RESOURCES FOR WIND FARM DEVELOPERS AND OPERATORS

Share information such as guidelines, template packs, surveys, questionnaires, educational resources and recommended training courses. This would provide those seeking best practices with practical tools and resources to ensure that community engagement strategies are effective and maximise the social outcomes from the development and operation of a wind farm. This could also include online resources such as virtual tours, educational portals and educational videos that can be utilised for learning opportunities.

BUILD LOCAL GOVERNMENT CAPACITY

Support local government to engage with developers in ways that are positive and productive for local communities, while maintaining their role as potential decision-makers and key stakeholders, in the planning and approvals process.

RECOMMENDATIONS FOR INDUSTRY ASSOCIATIONS AND NON-GOVERNMENT ORGANISATIONS (NGOS)

BUILD PARTNERSHIPS AND SHARE EXPERIENCES

Continue to seek partnerships with developers to help create the social conditions for support, including education, awareness raising and advocacy. Assist in wind industry peer-to-peer learning and dialogue, including through wind farm tours for potential hosts and community leaders, and open days. Assist in building opportunities between wind developers and other local industries and training organisations. Share stories of success that are helping to raise the bar of best practice community engagement and benefit-sharing.

SHARE INFORMATION ON INNOVATIVE PRACTICES FOR BENEFIT-SHARING

Establish available information regarding the effective forms and innovative approaches of benefit sharing, and outline the range of options through which such benefits could be shared (e.g. community funds, neighbour payments etc.).


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INTRODUCTION

Delivering positive social outcomes from wind development is a value proposition for communities, industry and governments alike, but can be challenging to facilitate.

This research project and resulting report, Enhancing Positive Social Outcomes from Wind Farm Development, aims to provide a snapshot of current community engagement practices for wind farm developments in Australia, in order to create a comprehensive understanding of what practices have been implemented, and consider what efforts are effective (or otherwise) for both wind farm developers and their surrounding communities. It also seeks to enhance opportunities and partnerships between developers and communities for shared positive outcomes. Ultimately, this project seeks to contribute an evidence base for improving outcomes from wind development for communities, regulators and wind developer companies, and advancing policy and development that supports renewable energy generation.

By using a collaborative and iterative research process involving a range of stakeholders including wind developers, experts, NGOs, regulators and community, this research seeks to generate a common understanding of the strengths, weaknesses, opportunities and threats of existing models of engagement and benefit-sharing. In doing so, this research provides a basis to evaluate current community engagement and benefit-sharing practices in wind development in Australia, and to develop pathways for achieving positive social outcomes. Furthermore, this research also involves establishing an understanding of the value and application of the Clean Energy Council's Community Engagement Guidelines for the Australian Wind Industry (2013).

An additional motivation for this project is that it appears there is currently a weak dialogue between policymakers, researchers and industry on issues of wind energy. Notably, there are significant differences between how academics and practitioners frame issues and how they "appreciate evidence, knowledge and the normative

purpose of planning" (Ellis et al., 2009, p.522), which can make it difficult to translate between the two parties. Academic research can offer insight into trends across time and space and is able to bring a depth of understanding from established bodies of knowledge (e.g. sociology, psychology, human geography, politics, science and technology studies). However, academic recommendations can be inaccessible, impractical and/or difficult to translate into action by practitioners. The research team and research design for this project sought to bridge this divide.

DEFINITIONS

COMMUNITY

For wind energy development, the community refers to all the people who live within, and identify with, the geographic area surrounding the proposed site. The physical extent of the geographic area depends on the scale and spread of population and local people's identification with significant settlements and towns.

COMMUNITY ENGAGEMENT

This definition is drawn from two current Australian sources. The Clean Energy Council's Community Engagement Guidelines for the Australian Wind Industry (CEC, 2013, p.8) describes community engagement in the wind industry as "the process through which a wind farm developer interacts with a community to inform the decision-making process of a wind farm project". The ACT Best Practice Community Engagement Guide for Wind Development (Lane & Hicks, 2014) defines community engagement as working "beyond the standard consultation processes typically employed to meet planning approval and compliance requirements".

BENEFIT-SHARING

Energy infrastructure is recognised to create a range of changes, including visual and amenity impacts. In response, energy operators have sought to share the financial and other benefits with the local and other stakeholders. This is usually directed at community members of closest proximity to the development (Embark, 2017).

This research report collates the project's research from four source documents – from a literature review, interview analysis, survey results and community engagement plan analysis – as well as feedback from 16 panellists and one advisor, to identify recommendations for practice. The intended audience for this report is developers, regulators, experts, NGOs and community stakeholders involved in, or affected by, wind farm development in Australia. Some of the findings are likely to also be relevant to wind farm development in similar contexts internationally.

BACKGROUND

The wind industry is positioned to contribute significantly to a clean energy future in Australia. It is also well positioned to supply low cost renewable energy investment and jobs, particularly in regional areas.

The development of some wind farms has faced community opposition for multiple reasons. In some cases, the level of opposition has led to unviable projects and the introduction of stringent policies for wind development. Ineffective community engagement and benefit-sharing practices are two factors that have been found to contribute to a lack of community support. What is far less researched, but which emerged from feedback from the panel, is the influence of a number of other factors on community opposition, including:

- organised anti-wind farm campaigns, often led by non-local organisations
- existing community conflicts and divisions
- changing policy and political environments.

Analysing these factors in detail is beyond the scope of this research and it is recommended that these be the subject of future research. In this report, the focus on the ways that community engagement and benefit-sharing practices has been found to increase positive social outcomes.

Community engagement is a general term used to refer to many activities including communications, consultation, participation and co-development. Over the past decade, the community engagement practices employed by the wind industry in Australia have lacked some of the diversity of techniques and benefits seen in other countries and industries. Recent wind energy developments led by developers (such as Windlab's Coonooer Bridge wind farm), communities (such as Hepburn Wind and Denmark Community Wind) and community-developer partnerships (such as that of Infigen and CENREC in the Flyer's Creek project) are shifting the goalposts by improving practices. Further, recent changes in state policies (such as the ACT's Reverse Auction) have increased attention to raise the bar of engagement and benefit-sharing.

Effective community engagement practices have been found in many situations to increase societal acceptance, a win-win for the developer and the local community. As wind-generated electricity is a relatively young industry in Australia, to date there has been little research to evaluate the on-ground effectiveness of different approaches to community engagement and benefit-sharing. This research report seeks to identify the characteristics of both effective and ineffective approaches.

On community engagement, two key previous documents that have sought to understand the influence of different approaches on wind farm approval have been from CSIRO (2012) and Ernst & Young (2015). The "Exploring Community Acceptance of Rural Wind Farms in Australia" report by CSIRO revealed the important role that early and well-designed community engagement can play in community acceptance, concluding that "inadequate consultation and engagement with the community is... a key process contributing to social conflict around wind farm development in Australia" (Hall, Ashworth, & Shaw, 2012, p5). The report recommended that local ownership models of renewable energy can enhance the sense of acceptance and ownership both because the scale of development is more appropriate but also, and "perhaps more importantly", because of the depth of consultation (Hall et al., 2012). However, it gave little detail on outcomes of various commonly used community engagement practices, and how the industry might shift towards a stronger culture of community engagement practice.

On benefit-sharing, the NSW Government's report "Strategic options for delivering ownership and benefit-sharing models for wind farms in NSW" (Ernst & Young, 2015) outlined benefit-sharing mechanisms for wind farm developments based on international precedents to assess their applicability in NSW. It recognised that benefit-sharing mechanisms need to be implemented within a broader context of community engagement. When combined, these can have a direct influence on community acceptance. The NSW report acknowledged one of its limitations as being reliant on desktop-based information and minimal stakeholder engagement. Therefore, that report provided limited shared understandings and culture change toward stronger engagement practices.

From existing research, it appears that a wide range of factors, including highly subjective and emotional aspects, mediate communities' responses to wind farms. These various social factors and their implications are not always well understood or (easily) considered in the wind development process. It is for these reasons that this research focuses on two key means through which wind developments interact with and contribute to local communities: through community engagement and benefit-sharing approaches. It is intended to build on and complement the CSIRO and NSW reports.

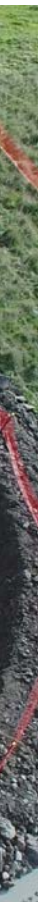
METHODS

This project was designed to have several phases and sources of data, in order to gather a range of perspectives and different depths and representative data.

The main method employed to gather this diversity of perspectives was the Delphi Process (Glass, Scott, & Price, 2013). This technique involves iterations of interviews and discussion in which intentionally-selected panel participants remain anonymous and engage through the research team, in order to maintain their anonymity. In this way, an opportunity for frank 'discussion' and reflection is created among a diverse range of stakeholders with different vantage points on an issue.

The total number of panel members participating in this research was 19; this sample ensured workability for the activities, as well as a broad enough representation of perspectives. In addition, two advisors participated. To engage with these panel members and advisors, the project secured ethical clearance through The University of Queensland Human Research Ethics Committee (#2016000866). The panel members were interviewed individually by a member/s of the project team between July and August 2016. Of these, 16 panellists and one advisor reviewed a draft discussion paper of emerging findings in June and July 2017, and responded to specific questions that emerged, and contributed to the draft recommendations posed. The panellists' responses to these questions were integrated into this research report, and the recommendations were revised. The panellists also reviewed the subsequent draft research report in August 2017.

This research created four source documents that were analysed concurrently to inform this report, in order to extract the key themes and findings that emerged from the combined research. A survey of wind industry stakeholders occurred concurrently with in-depth interviews of the selected panel members as well as four additional interviewees. The findings from these informed the research questions for the subsequent literature and information review and the analysis of existing Community Engagement Plans (CEPs). The diversity of the sources allow for triangulation of findings from multiple data sources to identify the strongest points of alignment. This research draws on both primary/empirical research (the survey and interviews) and secondary research (the analysis of CEPs and other academic research findings). The recommendations and conclusions presented in this document are based on the dominant points of alignment across all four data sources. The full reports from each of these source documents are provided in the Appendices.



METHOD 1: LITERATURE REVIEW

A literature review was undertaken to explore publications regarding the relationships between the public and wind turbines in order to combine academic knowledge with practitioner and community knowledge and experience. A majority of the articles were founded on field research, such as case studies or surveys. The literature was examined to focus particularly on the attitudes and responses of people living in close proximity to the development. The literature was reviewed to identify the factors that contribute to positive or negative social outcomes, and the range and effect of community engagement and benefit-sharing practices being deployed. The review also sought details on the concepts and specific practices that could inform policy and practice for the wind energy context in Australia.

The literature review involved a review of 57 academic texts, including peer-reviewed journal papers, edited books and research reports published between 2005 and 2016. An emphasis on research from the Australian context in reference to international experience was enforced to identify any significant points of difference, practices and perspectives that are not yet common in Australia but could inform practices. Articles were sourced through keyword searches in academic search engines and via cross-referencing bibliographies until a point of saturation was reached. Literature covers a wide range of geographic contexts, but largely in the 'Global North': Australia (9), US & Canada (4), United Kingdom (14) and Europe (24). A small number (4) of articles were purely academic and involved no empirical data collection. A number of German language articles were also analysed by a native German speaker. The literature represented a mix of methodologies, including qualitative (16) and quantitative (11) analysis. Specific methods reported in the literature included surveys, case studies and Q methodology.

METHOD 2: REVIEW OF COMMUNITY ENGAGEMENT PLANS

An analysis of Community Engagement Plans (CEP) focused on the plans of developers for community engagement and benefit-sharing in specific wind farm developments. The analysis involved a review of 32 CEPs supplied voluntarily and in confidence by Australian wind developers on the condition of non-disclosure. While not all developers provided CEPs for review (including no CEPs from community-owned wind energy projects), the plans provided were sufficient to create a basis for analysis and to form a view about current practice and the type of variation that is occurring. The CEPs encompass a range of information including principles, objectives, stakeholder identification, methods of communications and engagement, and (in very few cases) evaluation plans. In some cases, CEPs included evidence of evaluation and/or community response to the plans, enabling an element of analysis between what was planned, what occurred and to what effect. The CEPs covered almost all stages of the lifecycle of wind farms and developments across all states and territories. The CEPs reviewed represent a significant range of companies and projects that include larger and small developers; some that are vertically integrated; some with multiple, large projects and some with one small asset (both in number of turbines and size of turbines); some implementing community co-investment; some in isolated communities, and others in populated communities.

The source documents that informed this research can be found at **cleanenergycouncil.org.au/windreport**

METHOD 3: ONLINE SURVEY

The Industry Community Engagement and Benefit-sharing Survey ("the survey") invited industry perspectives and practice on community engagement and benefit-sharing in the process of wind development and operation. The survey was sent via email to individuals in leadership and community engagement roles. It included 50 questions (19 quantitative and 31 qualitative questions), covering aspects such as the resourcing, staffing, timing, purpose, activities and outcomes of engagement and benefit-sharing. The circulation list for the survey was compiled from the Clean Energy Council (CEC) membership database and supplemented to include key developer types (e.g. community wind projects) that were not CEC members. The survey sought the widest possible sample size. Respondents were self-selecting and there were no enticements to respond. It was conducted between May and August 2016.

The survey received 26 responses. The majority of respondents were managing projects in Victoria (16 per cent), NSW (14 per cent), SA (9 per cent) and WA (7 per cent). Staff generally managed two to three wind developments each. Survey respondents held a range of roles within their companies, though most were in community engagement (43 per cent) or leadership roles (e.g. CEO) (25 per cent). A majority had worked in the wind industry for seven years or more and had on-ground experience with community engagement. While 35 per cent had some form of relevant training or qualification, it was more common for people to have specific training in communications rather than community engagement. Half of the wind companies represented were larger companies, with 20 or more full time equivalent (FTE) staff, and most of these had dedicated community engagement staff. Six responses were from community-owned wind developments, and two from community-developer partnerships involving some form of community co-investment or co-ownership. It is worth noting that of the 79 operating wind farms in Australia, only two are community owned. Thus, the survey received a high proportion of responses from community-owned wind farm proponents. While the survey did not comprehensively cover the entire industry and respondents may not necessarily be a representative sample, the number and diversity of respondents does provide a good range of perspectives and practices present within the wind industry in Australia.

The survey did not require mandatory responses to each question. This approach was offered to ensure that respondents could respond only to questions to which they had experience or opinions, and to avoid forcing a response on a sensitive topic. To manage expectations in the analysis, the sample size is provided for each response or results are provided as a percentage.

METHOD 4: IN-DEPTH INTERVIEWS

In-depth interviews were conducted with the 19 panel members to understand their experiences and perspectives on wind farm development in Australia. The interviewees were selected as they have all had interaction and/or direct involvement in wind energy development/s and represent a diverse group of stakeholders that play an important role across the spectrum of wind energy deployment in Australia. This included two interviewees who represented community-owned projects. An Australian Indigenous person with experience in wind energy was sought for an interview, but was not able to be located in the time available. The project team recognises the omission of this perspective and stakeholder group. Three additional interviews were conducted with non-panel members ('advisors') who were considered as experts in wind farm and community development. They were sought to increase the breadth of the data. The resulting 22 interviewees represented the categories and sectors of wind developers, community, regulators and government, academics and experts, and non-government organisations. The final representation is featured in Table 1.

Interviews were conducted by the project team members between July and August 2016, were held at a location of the interviewees' choice, and were 60-120 minutes in duration. Interviewees signed a consent form before the interview proceeded. Interview questions were semi-structured and varied slightly by stakeholder type, being tailored to the different roles that they represented. Interview questions are included in the Appendices. Interviews were partially transcribed and coded according to themes. Developing the coding themes was an iterative process informed by the dominant emerging themes from the multiple sources of data informing the research (e.g. interviews, literature review, community engagement plans, survey of developers).

Table 1: Summary of interviewees by stakeholder type

Stakeholder type (Code)	**Representation**	**No. interviews**
Wind developers (D)	Companies with operations in NSW, SA, ACT, WA and VIC. All are corporate developers, developing projects in a range of location types and sizes.	7
Regulators and government (R)	National, state and local government jurisdictions.	3
Non-government organisations (N)	Organisations active on wind energy issues and engaged in public debate on renewable energy and climate change issues.	2
Academics & experts (E)	Included an academic researcher, a health professional and a financial analyst.	6
Community members (C)	One community member from a very large operating wind farm, one from a community wind project, one from a Community Consultative Committee, one turbine host and one direct neighbour.	4
Total interviews		**22**

OVERARCHING FINDINGS

This section presents the overarching findings that respond to the research questions of the project, namely:

- **What is the current understanding and attitude to wind farms in Australia?**
- **What is the current status of community engagement and benefit-sharing practices in Australia for wind farm development?**
- **What has been the contribution of manuals ('guides') to community engagement on wind farm development in Australia?**

CURRENT UNDERSTANDING OF SOCIETAL ACCEPTANCE AND ATTITUDES TO WIND FARMS IN AUSTRALIA

Social acceptance is considered crucial to the expansion of renewable energy and the ongoing viability of the wind industry in Australia (D'Souza & Yiridoe, 2014; Howard, 2015). Hindmarsh's (2014, p.541) research into community engagement practices around wind development in Australia found that inadequate or poor engagement is a primary issue "underpinning a host of issues that local communities faced with the prospect of hosting wind farms".

Research reveals that many factors influence people's responses to, and relationships with, a wind farm development in their local area. Personal reactions to wind turbines in a landscape are mediated by a mix of historical, psychological, cultural and experiential factors (P. Devine-Wright, 2011a, 2011b). Similarly, Ellis et al. (2007, p.519) found that "public perception of wind farms is a multi-dimensional phenomena constituted through a range of complex cultural, contextual, socio-economic, political and physical factors". Community engagement and participation in decision-making processes can also generate support for wind developments (Bell, Gray, Haggett, & Swaffield, 2013; Fast & Mabee, 2015; Gross, 2007; Hindmarsh, 2010; Walker & Cass, 2011; Wolsink, 2007).

There was a sense expressed in the interviews that a shift had begun in the Australian wind industry towards valuing and practicing improved community engagement and benefit-sharing. As a result, there was a perception that community engagement was more readily discussed and considered. The range of events and activities that were identified throughout the interviews as assisting to 'change the game' included:

- **The ACT Government's Renewable Energy Reverse Auction requiring community engagement**
  In the assessment criteria, a 20 per cent weighting was directed to community engagement, as well as use of local contractors and contribution to trades training; the auction documentation included the Best Practice Guide in Community Engagement for Wind (Lane & Hicks, 2014).
- **The Clean Energy Council's guidance**
  The CEC Community Engagement Guidelines (CEC, 2013) and its role in convening developers to share experiences was cited as influencing better practice.
- **Investor expectations**
  Several developers commented that investors in wind farms were becoming more attuned to community acceptance and requiring evidence of good community outcomes before they invest.
- **Power purchase agreements**
  Organisations, such as local councils, wanting to sign power purchase agreements increasingly want evidence of good engagement and strong social outcomes.
- **The presence of industry leaders**
  Examples of innovative and effective community engagement and benefit-sharing being implemented by respected leaders in the industry are helping to raise the bar of what is expected and providing examples to learn from.
- **Shifting culture**
  Some wind developers were beginning to value engagement as an integral part of the success of their business, making better practice a fundamental part of corporate culture.

The literature supports these activities and other approaches to increase societal acceptance of wind farms. Table 2 provides a summary of key factors identified through the literature review that were found to positively contribute to these social outcomes, and the role (or purpose) they play in the creation of positive social outcomes.

Table 2: Factors contributing to positive social outcomes from wind development (from the literature review)

Factor	Purpose
Advocates from within the community.	Trusted local voices to be able to speak to others and policy makers; having local people mobilised to publicly support the project.
Community as (co)owners of the wind farm (implies that community has both investment and decision-making control).	Increases community participation, influence and support as well as facilitating broader local sharing of benefits; increases likelihood that the development is seen as appropriate and complementary to local identity and sense of place.
Community as co-investors or partners in larger development (implies investment opportunities and decision-making influence, but not control).	Increases community participation, influence and support as well as facilitating broader local sharing of benefits.
Community participation in decisions around siting of the wind farm and/or individual turbines.	Increases likelihood that siting of the wind farm is seen as appropriate and complementary to local identity and sense of place.
Opportunities for public input and discussion leading to co-developed solutions and influence over wind farm design.	Sense of fair processes; local influence over project design (e.g. benefit-sharing package, turbine locations; engagement approach as well as turbine siting).
Community engagement that starts early; is sustained over time and is participatory.	Allows for many points of interaction and sources of information over time; facilitates long-term relationship building and trust; allows for feedback loops.
Building trust and long-term relationships.	Contributes to the basis for productive (open, honest, constructive) relationships between wind developer and community.
Best practice guidelines / guidance (both industry and government).	Establish clear and shared expectations; sets standards and norms; can help to build trust.
Benefit-sharing (of various types) within local neighbourhood and local community (beyond turbine hosts).	Spreads economic benefit more widely and fairly; ameliorates 'winners and losers' dichotomies; helps to match scale of impact with scale of benefit; builds wider support.

Despite these efforts and the apparent shift to increase societal acceptance, opposition to wind farm development continues to be reported and experienced by wind farm developers and communities. The perceived high levels of public opposition are often affected by the ability of certain actors to frame the public acceptance debate, rather than being an accurate reflection of the majority of people's views. Often the public debates (e.g. in the media or submissions to planning processes) are framed by those who express their views strongest, are most motivated to do so and/or who have the best access to resources, knowledge and connections (Bell et al., 2013; Ellis et al., 2009; Hall et al., 2012).

There is a range of Australian and international literature that moves away from the umbrella explanation of 'Not In My Backyard' (NIMBY) as a credible explanation for opposition to wind developments, as it "overlooks the complexity of why people may object to a wind farm proposal, fuels conflict because of its derogatory implications and contributes to poor responses to such disputes" (Ellis et al., 2007), p.536). Indeed, NIMBY explanations can contribute to creating "unhelpful

'us-them' opposition groups that act to dismiss what might be legitimate and far more nuanced criticisms of a development" (P. Devine-Wright, 2011b, p.xxiii).

Using NIMBYism as an explanation for opposition assumes that the main cause of people's objection is selfish motivations of being unwilling to accept a wind farm in their local area, even if they support wind power in general. Rather than being interpreted simply as NIMBYism, it is important to understand why local people express more concern once a specific development is announced. This gives an understanding of the conditions under which they might come to support the development, or the triggers for conditional support. Research has found that people's perceptions of the equity and fairness of both the development process and its outcomes play an integral role in informing people's conditional support (Wolsink 2007, p.1188).

Beyond NIMBY, the reasons for opposition can be physical as well as social. The social responses can be based on fear of the unknown. Some researchers have found that "people's fears about the prospect of windfarm development have proved to be largely unfounded, and that the reality is less visually intrusive, noisy and despoiling that they had expected" (Warren & McFadyen, 2010, p.210). One of the most commonly-referenced causes of socially-derived negative attitudes to wind farms is a lack of community involvement in decision-making processes, particularly through common use of "decide-announce-defend" approaches to wind farm development (Baxter, Morzaria & Hirsch, 2013; Haggett, 2011; Howard, 2015; Wolsink, 2007; WWEA, 2016). This approach involves taking complete plans to the community, with only very minimal opportunity for feedback. Rather, the approach is to justify the decisions that have been made, with them being open to change. The World Wind Energy Association found that "a lack of meaningful and timely opportunity to have a say in decision-making can contribute to public scepticism, mistrust and opposition" (WWEA, 2016, p.xxiii). From the survey, some interviews and general media, it appears that decide-announce-defend approaches are still common in the Australian wind industry at present.

The placement of turbines and their physical influence on the landscape can also influence opposition, resulting from impacts on both the actual view, and the sense of place. Groth and Vogt (2014, p.7) found that "turbine placement close to residents may heighten their uncertainty and concern of the wind turbines and overshadow any positive inclinations towards the development". In Australia, researchers found that perceptions of "spoiling a sense of place is a primary cause of enduring social conflict" (Hindmarsh, 2014, p.194).

There remain significant and genuine conditions of public concern and opposition to wind development that call for better understanding of the conditions under which there is likely to be greater local support for wind development. In Australia, this is particularly pertinent given the unstable policy environment for renewable energy and the resulting need to build stronger and more active support for wind farms. In responding to this apparent opposition, the research recommends the value of normalising opposition (rather than neutralising it) to allow debate and deliberation (Ellis et al., 2009).

CURRENT STATUS OF COMMUNITY ENGAGEMENT AND BENEFIT-SHARING PRACTICES IN THE WIND INDUSTRY

The two main identified initiatives for wind developers to negotiate and interact with community and other stakeholders were through community engagement practices, and through offering to share the benefits arising from the wind farm. This section presents the current status of each in separate subsections.

STATUS OF COMMUNITY ENGAGEMENT PRACTICES

Community Engagement Plans

The analysis of 32 Community Engagement Plans (CEPs) for wind developments found that the language and structure used indicates that the industry is interested in engaging meaningfully with communities and that they are seeking to learn and improve practice. The CEPs communicate an intention to respond to and meet, or exceed, community expectations. Overall, the CEPs provide a clear guide as to how, why and who will be engaging with the community in relation to specific wind farm proposals. They outline the developer's intent to develop strong positive links with the community, recognising the value that these relationships bring. Clear trends towards using guides (such as the Spectrum of Public Participation (IAP2, 2004)), and the use of Community Consultative Committees were evident in most CEPs. There was also evidence of new initiatives being trialled that include co-ownership, co-investment and neighbour benefits, particularly in projects located in eastern Australia.

Some plans referenced company values that underpin their engagement activities, along with the role of senior managers in assisting to deliver engagement on-the-ground.

This active involvement of senior managers and the whole-of-company approach serves two purposes: to gain company buy-in for the engagement and its outcomes; and to demonstrate to a community that the company's identity and values are tied to achieving a positive engagement outcome.

Of note, the CEPs written more recently (in the last five years) and located in the eastern states generally demonstrate a more comprehensive set of engagement tools being deployed. These plans are more likely to include benefit-sharing options such as project co-ownership, neighbour payments, sponsorship and/or community grants. They are also more likely to include opportunities for greater community involvement in decision-making. These are the CEPs where the language often includes more references to collaborate, involve and sometimes empower. These trends are likely to reflect industry learning and maturation, as well as the influence of shared norms being collated into guidelines (such as those released by the Clean Energy Council), which were introduced in the past five years.

A noted limitation in the CEPs analysed is the unknown degree of implementation of CEPs. Furthermore, there is a lack of metrics or process to evaluate and or audit the delivery of the community engagement in the majority of CEPs reviewed. Most plans do not have any formal evaluation process outlined in them. Some CEPs do not mention evaluation at all.

Linked to this observation is the apparent separation between the author of the CEP and the staff implementing it in-house, which can affect the implementation and subsequent evaluation of the CEP actions.

In summary, a well-written, detailed CEP does not make the implementation of engagement better or worse. At the very least, the existence of a CEP provides the framework for community engagement activities to be undertaken. The three other source documents provided useful basis for cross-referencing the insights from the CEP analysis.

Purpose of engagement

The survey results indicated that respondents understand the primary purpose of community engagement is to build relationships (26 per cent), followed by a need to inform and educate (17 per cent), build and maintain a social licence to operate (15 per cent), and that it is a "must do for project approval" (13 per cent). Some (9 per cent) say community engagement is part of creating a well-designed development that is well integrated into the local area, adding value to the project as a whole. Only 8 per cent saw community engagement activity as being "at the heart" of wind development; these were responses of people involved in community wind energy projects. It appears that the purpose of engagement is also viewed differently depending on the roles played in the organisation.

Motivations for engagement

The survey sought to understand the risk-based motivations of undertaking community engagement. The results (from 14 respondents) can be categorised into social risk (losing existing social licence with broader community; losing local government support; tense or divided community; non-cooperative landholders; and unable to manage community expectations) and project risks (reactive rather than proactive engagement; site abandonment and associated financial loss; impact to company reputation; and planning development approval rejection and associated costs).

Beyond the risk of not undertaking effective community engagement, the survey also explored the impact of political and market pressures on the organisation's motivation to conduct such engagement. Responses indicate that external pressures cause changes in community engagement. The biggest proportion of respondents (39 per cent) identified that changes to policy environment or market pressures resulted in new requirements that mandated changes in their community engagement approach. For 26 per cent, external pressures have led to more difficult operating environments in which there are fewer available resources for community engagement. In some cases this has led to reducing staff and funding levels for community engagement activities. For 22 per cent, community engagement has always been important and has been maintained as is. Finally, 9 per cent identified that external context changes caused them to realise that a new (improved, more rigorous) approach to community engagement is necessary and required them to change their approach voluntarily.

Values inherent to engagement

In considering the current practices of community engagement, the survey results elicited the key values of effective engagement as experienced by the survey respondents. The values were to bring honesty, transparency (where practical) and integrity; to adapt approaches to the local context; to manage expectations regarding the scope of options open to negotiation and contribution by the community; to maintain regular and face-to-face contact with feedback on community requests; and to share the benefits broadly across the community.

The interviews gathered a range of value-change approaches that had been found to be effective in shifting the culture of wind developer companies towards valuing strong community engagement practices:

- **Initiating culture change and training at company and sector levels**
  It is essential to have understanding and support for community engagement from the senior management level. Training in community engagement skills was recommended by interviewees for all staff, not just those in community-facing roles, so that it contributes to a culture change across the organisation where community engagement becomes widely understood and valued. At a sector level, there was evidence that one company's practice can influence others – in both positive and negative ways. Changing the culture of the whole industry was seen as valuable.
- **Embracing a crisis as an opportunity for change**
  Interviewees noted that their experience of 'when things do not go to plan' within their company had clarified the value of good, early engagement and increased internal company support for better community engagement practice.
- **Implementing codes of conduct for staff and contractors in community-facing roles**
  Interviewees recommended setting protocols and expectations for how staff and contractors behave on site and in the local community, as they are the face of the company.

Key practices applied during engagement

The survey collated responses on engagement activities that are most regularly used across all stages of wind farm development. There is a dominant reliance on one-on-one engagement and one-way information flows, alongside engagement with local and state government stakeholders. Much less used are opportunities for two-way dialogue, such as conversation or workshops, in a public or group setting (e.g. facilitated workshop, public meeting or neighbourhood meeting). Education and experiential opportunities are also rarely used (e.g. wind farm tours, open days or advocate training), in addition to drop-in information sessions during the planning and approvals phase. Table 3 displays the activities in order of usefulness, with the percentage indicating the number of respondents who felt that it was "very useful". Some activities are more valued than others, while there are no activities that are considered overwhelmingly useful. It appears there is little use of feedback mechanisms (e.g. workshops, polling or voting) despite the literature and interviews indicating these to be very useful.

Table 3: Perceived 'usefulness' of community engagement activities (from the survey)

Rank	Tools	%
1	Website	14
2	Public meetings	13
3	Written materials	12
4	Drop-in style information sessions	11
5	One-on-one meetings	11
6	Community Consultative Committees	9
7	Focus groups, facilitated workshops	9
8	Survey, voting or polling	8
9	Participation in local events	7
10	Wind farm tours	6

Cross analysis between the survey and interview results indicates some points of contention. For example, people identified that wind farms tours, which offer opportunities for first-hand experience, are particularly useful – whereas the survey revealed tours are rarely used. Similarly, the survey revealed that it is common for engagement to be focused on information provision and one-on-one contexts. This emphasis contradicts sharply with interviewees' reflections that the most effective community engagement practices involve collaboration, a community-wide approach and genuine opportunities for community feedback and suggestions to be considered. Another particular point of difference is the sentiment toward public meetings – while being ranked as the second most useful community engagement tool in Table 3, the interviews and other survey questions indicated they are rarely used and even not recommended, as they can be easily de-railed by vocal interests.

Respondents were asked during the survey to identify community engagement or benefit-sharing techniques they felt had not been effective. Several dominant themes emerged, including public meetings (e.g. town hall meetings), private negotiations, use of one-way methods only, inflexible or one-size-fits-all approaches and tokenistic engagement that does not provide genuine opportunities for influence or participation. Of these, town hall meetings were the most common technique that people identified as not being useful (referenced by 33 per cent of respondents).

Many of the panellists cited negative experiences from public town hall meetings. This was due to the meeting occurring late in the development process, and thus are likely to be attended by local or non-local stakeholders with established oppositional views that can limit constructive and solution-oriented discussions. Regardless of when they occur, conducting public town hall meetings was seen to be problematic as they can be easily dominated by the loudest voices and result in community polarisation. Several panellists offered process and logistical suggestions to improve the usefulness of such public meetings, including holding them early in the development process, involving an independent facilitator who sets ground rules for discussion to enable the 'middle views' to be heard, providing a clear outline of topics to be discussed, and communicating with honesty and transparent information. Ensuring outcomes and questions are followed up is also essential.

Further detail was provided on ineffective practices during the interviews. This included the negative impact of prospectors (where the first engagement is done by a company who has no long-term interest in the site or commitment to the community); of late and defensive engagement (known as decide-announce-defend); of not taking people's issues seriously/ being dismissive; requiring 'gag clauses' or other conditions of agreements; negotiating compensation or benefit-sharing privately with specific community members; and offering benefit-sharing initiatives without community consultation.

Budget and timeframe for engagement activities

Given that long-term, local and face-to-face engagement has been identified as yielding the greatest positive outcomes for a wind farm development, budgetary considerations for engagement emerged as crucial from the survey results. Almost all companies, regardless of size, agree that there is a financial benefit for successful community engagement. The findings from this research shows that companies with 11 or more FTE staff consistently direct specific funding to community engagement. Larger companies are also more likely to view the budget for community engagement to be sufficient, whereas the majority of small companies think it is insufficient. Despite their small size, 75 per cent of these small companies have dedicated community engagement budgets and considerations (including voluntary time contributions).

Survey responses indicate that community engagement activities usually start early in the project lifecycle, upon site selection (58 per cent) or during feasibility studies (96 per cent). Only one respondent indicated waiting until the planning and approvals process to start engagement. The predominant reason stated for initiating early engagement was to enable community participation in project design and to 'bring the community along on the journey' to wind farm development. It is unclear, however, if this early engagement extends beyond engagement with project hosts.

In summary, the current status of community engagement in Australian wind farms has been early engagement, being adaptable and enabling the community to have a level of input. However, the choice of language to describe these activities differed across the responses: from seeking authentic partnership with a community to a more top-down, or even 'cowboy' direction from other companies. This indicates that while many developers are more effectively consulting with communities, there remains scope for improving the approaches taken by developers to enable community input into a range of decisions regarding wind farm, community engagement and benefit-sharing design. This would involve identifying certain decisions that are open to community feedback, or even delegating certain decisions to the community (such as the benefit-sharing model). In addition, there is wide variation on what 'early' engagement entails, including both what activities, who is involved and when they start. For example, it was unclear whether early engagement involved more than speaking with potential hosts during the site selection phase.

Status of benefit-sharing practices

The use of multiple and contextually appropriate means of benefit-sharing has been shown by many researchers to have a positive impact on people's support for nearby wind farms (Bidwell, 2013; Fast & Mabee, 2015; Howard, 2015; Walter, 2014). Importantly, community benefits "create legacy projects which affect the long-term daily associations [that] residents have with the wind farm" (Fast & Mabee, 2015, p.34). Being able to focus on the potential positive impacts of a wind development has been found to build support for proposals where benefit-sharing is seen to be genuine and fair (Hall et al., 2012). However, the literature also identified that benefit-sharing methods can only increase support where it is genuinely addressing distributive fairness rather than as a means to quieten opposition (Bell et al., 2013; Haggett, 2011). Several researchers identified the challenge that the positive gains made through greenhouse gas reduction occur on a national and international scale, while the impacts, including noise and aesthetic changes, are obvious at the local level – and that benefit-sharing can help to acknowledge and overcome this 'disjunct' between local impacts and national and international benefit (Haggett, 2011; Hall et al., 2012).

The literature noted an important differentiation between benefit-sharing and bribery or compensation (Aitken, 2010). For benefit-sharing, this was described in the interviews as a means to achieve a fairness of outcomes, and to provide benefits that are seen to be proportionate to the changes taking place and which are distributed equitably. The interviewees raised three aspects of fairness that were of importance to them: that local benefits are proportionate and commensurate to the nature of change, recognising that local people will experience and perceive this change differently from each other and the developer; that benefits are distributed amongst local people in a way that is understood to be fair among hosts, neighbours, council and the broader local community; and that the benefit-sharing is matched with a fair process, to avoid being viewed as tokenism or bribery.

In Australia, the wind industry has recognised that there will be some impacts on near neighbours. The CEP analysis described approaches such as community grant funds, neighbour payments and (less commonly) co-ownership or co-investment being implemented by some companies as a way to increase benefit-sharing. In response, as detailed in the survey results, neighbourhood benefits and community funds are all becoming commonly applied approaches and setting a precedent for industry standards. The effectiveness was noted by respondents as being influenced by how benefit-sharing is used, and how it can change the dynamics in the community. The interviews provided detail on the financial motivation for considering benefit-sharing options. This included the view that benefit-sharing can reduce project costs overall, that it assists to secure finance and power purchase agreements and that it contributes to a better operating environment for wind development (better social acceptance, less policy and regulatory risk). Hence, it also enhances the likelihood of future projects being successful. Furthermore, the interviewees noted that the full costs of benefit-sharing is unlikely to be significant within the total project budget.

In Australia, there is no current policy requirement regarding benefit-sharing packages, but this is seen by interviewees, panellists and literature as creating a key advantage, which "is the flexibility it enables developers and communities to co-create [benefit-sharing mechanisms] which best meet their needs" (Ernst & Young, 2015, p.36). Without legislated guidance, a range of benefit-sharing mechanisms have emerged:

- **payments to communities**
  (community benefits funds, sponsorship).
- **payments to landowners**
  (landowner lease payments, proximity rent model).
- **community co-investment or co-ownership**
  (community members have a direct financial stake in the project, and, in the case of co-ownership, a role in the decision-making process of the wind development).
- **non-cash benefits**
  local employment and procurement, undertaking landscaping and vegetation screening, running energy efficiency programs, installing solar PV or hot-water, participating in education and training and local infrastructure upgrades and discounted electricity. While these things bring economic benefit to a local community, they do not involve on-going cash payments by the developer.

The survey reveals a low level of benefit-sharing in the 19 project examples provided by respondents. For those that do undertake benefit-sharing, the most common forms are sponsorship (25 per cent) and community grant funds (34 per cent). Seventeen per cent of respondents are also using (or plan to implement) community co-investment or co-ownership. It is noted that the response rate to this question was the lowest of all questions in the survey (15 responses, four of which were community-led projects), potentially reflecting a level of unfamiliarity and inexperience with benefit-sharing among respondents.

The low adoption of benefit-sharing was explained in the interviews, where most developers were interested to try new forms of benefit-sharing, but had not yet implemented any and were wary to do so. This wariness appeared to be derived from a lack of familiarity or experience with the new forms and some influence from changeable national policy environments. There was also minimal sharing of ideas and experience between developers – with many initiatives being dominated by commercial-in-confidence requirements.

The information that developers do hold was not detailed enough to instil confidence to adopt such initiatives. Other aspects that emerged from the source documents that have limited benefit-sharing implementation in the Australian wind industry have been:

> **Place-appropriate**
Engagement and benefit-sharing must be place-appropriate and approaches must allow for flexibility, and must be in-line with each other for perceptions of fairness and genuineness. Otherwise, benefit-sharing can be seen as bribery. Integrate benefit-sharing into CEPs developed for each specific project and community.

> **Lack of comprehension**
Benefit-sharing options are currently poorly understood, and there is evidence of several concerning trends that could undermine the practice: language of compensation, the use of gag clauses and offering benefits late in the piece, in a secretive manner (in a context of poor engagement practice). This risks undermining the contribution that benefit-sharing (particularly with neighbours) can have on perceptions of procedural and distributional justice.

> **Financing structure**
Each company is likely to have different ways of financing projects and different means of benefit-sharing that need to be tailored for specific and local circumstances. Co-investment and co-ownership are new in the Australian landscape, so there is unfamiliarity with how to integrate these alongside traditional ownership and financing arrangements for wind farms.

THE CONTRIBUTION OF GUIDES TO COMMUNITY ENGAGEMENT PRACTICES

Wind developers have increasingly created Community Engagement Plans (CEPs) over the past decade. The CEPs were analysed to gain insight into wind developers' understanding and practice of community engagement. The CEP analysis found that the two main documents on which the CEPs had been based were developed in the last five years: the Clean Energy Council's Community Engagement Guidelines for the Australian Wind Industry (CEC, 2013), and the ACT Government's Best Practice Community Engagement in Wind Development (Lane & Hicks, 2014). For example, three CEPs included a table of guiding principles that had been adapted from Best Practice Community Engagement in Wind Development, such as appropriateness and responsiveness. As evidenced in a large number of CEPs, the use of the guiding principles provided a platform upon which all engagement was built. It also created greater transparency with the community about developer actions and intent.

In general, CEPs reflect a depth of engagement with the concept of degrees of engagement, as presented in the IAP2 Spectrum of Public Participation (IAP2, 2004). This spectrum, commonly referenced in community engagement guides, positions engagement practices on a spectrum from inform, consult, involve, collaborate and empower. There is a trend for CEPs to pick up on language of collaboration and empowerment. It is unclear, however, the degree to which this language has been genuinely understood, integrated and translated into practice. During the interviews and survey for this project, wind developers, experts and regulators communicated that guides were a useful tool that assist to inform practice and set a standard. Some interviewees considered that the guides were a good 'carrot' to encourage better norms without resorting to the more rigid requirements of regulation.

The CEC's Community Engagement Guidelines was the most widely-used community engagement reference tool, with 78 per cent of the respondents having used it. However more than half (56 per cent) also used the IAP2 Spectrum of Public Participation and 44 per cent used the ACT's Best Practice Community Engagement; 13 per cent used other guides or reference tools. It must be noted, however, that the survey response rate dropped by over 40 per cent for this question. This might indicate that respondents do not use guides, are not aware of them or that they felt uncomfortable commenting on this.

SPECIFIC FINDINGS

This section provides specific findings that emerged from the four source documents prepared for this research report. They cover detailed aspects of community engagement and of benefit-sharing practices, including the value of trust, the role of specific wind industry staff, the contribution of face-to-face engagement to relationship-building and the various models of financial and other benefits provided to hosts, wind farm neighbours and the broader community. Each of these specific aspects is set out in subsections below.

BEST PRACTICE COMMUNITY ENGAGEMENT

A range of aspects were recommended that had contributed to effective community engagement. When asked whether a benchmark could be established and evaluated, the panellists offered mixed support. For the majority, they considered that there was a need for a tailored approach for each community from a range of available strategies.

However, there was clear support by panellists for training to raise the standard of engagement, and for public exposure of effective practices and benefits. While panellists acknowledged the important contribution of best practice community engagement to increasing the likelihood of positive social outcomes, they also raised the experience that sometimes even quality engagement cannot shift organised opposition or existing community divisions.

The influence of context

A range of contextual issues were raised in the four source documents. These covered the contexts of the regulatory environment, the scale of the wind farm, the timescale of the development along with the type of surrounding land use and the nature of the local economy. This context was identified through the four source documents as having a strong influence on the way in which community engagement needed to be planned and implemented. This is because, as emerged from the interviews, local contexts vary significantly by a number of cultural, historical, demographic and geographic factors. This makes different community dynamics very complex and context specific. The community's relationships with landscapes are often deeply connected – and thus emotionally loaded. In response, successful approaches to community engagement were found to be best when integrated within detailed understandings of the local community and founded on local knowledge.

In response to this context, panellists advised that each proposed wind farm development's local context be well-understood as a precursor to developing a community engagement strategy. Many considered that this was already occurring, and that relevant contextual categories include an understanding of local economic activities, topography and other local developments, and profiling those who may feel negatively impacted by the wind farm. Panellists noted that flexibility for specific contextual characteristics of a community should be ensured.

Regulatory context

The changeable policy and market environment for renewable energy and wind energy has caused significant uncertainty and financial hardship for developers. This policy uncertainty and change has caused delays in projects. The panellists emphasised that such delays should be explained as such. This has the dual benefit of explaining the political context that can support or hinder wind farm development, but also may trigger local communities to advocate for progress and policy certainty. Beyond this, panellists advised that community engagement funding should be planned to cover 'quiet times' during delays, so that engagement is not suspended during that time.

In the interviews, some interviewees were highly critical of regulation, claiming that it had limited wind development through activities such as the reviews of the Renewable Energy Target, the VC82 regulations in Victoria and the draft NSW Planning Guidelines. For example, the VC82 requirement for all residents within 2 km of a proposed turbine to give their consent to the planning application has led to a widespread mistrust of wind and a "perception that 2 km is a danger zone". One developer described the law as trying to "force developers to cut deals with neighbours", indicating that the law led some developers to attempt to buy support from neighbours, often with 'gag' clauses included in the agreements. Respondents expressed significant concern that an overly prescriptive approach to community engagement and benefit-sharing in the planning approvals process would remove developers' ability to be flexible and adaptable to the specific context of each development and local community.

There is some discussion regarding the introduction of an accreditation process for community engagement ahead of future reverse auction processes. However, the panellists expanded on the criticism of increasingly 'prescriptive' guidelines for community engagement and benefit-sharing. This was explained as inappropriate as the scope, activities and budget for effective engagement are all affected by the history and process of the community and wind farm development. Instead, panellists suggested either a very flexible process for engagement, or alternative measures used, based on transparency and promotion (and associated increased expectations) of positive engagement case studies. Training was supported by the panellists; there was also an identified need to create a training or accreditation process for prospectors.

At a local government level, the interview analysis and survey responses identified that local government (councils) can play an informal yet critical role in wind farm development. Survey responses indicated that local government support was an indication of successful community engagement and benefit-sharing, and that losing this support jeopardised such efforts. However, the interview responses also indicated that local government are not always aware of best practice and are timid in their dealings with wind developers, partly as a result of concerns regarding conflicts of interest. They may also be less equipped and less experienced in dealing with large developments and may have concerns about the politics surrounding large energy projects such as wind farms. Interviewees suggested that local governments could benefit from support (e.g. training, resources, advice) to help ensure they are able to negotiate best practice community engagement and reasonable local benefits from developments.

Scale of wind farm

The size of the wind farm can be a strong influencer on community engagement, as the physical impact differs with scale. Local perceptions of impact vary by context, though generally large turbines and many of them will be more likely to be seen as a having a greater impact and disturbance in a local area. The greater the change, the more management will be required to integrate it into the local community in a positive way. In general, this indicates that larger turbines and larger wind farms will involve more attentive, intensive and resourced community engagement practices. This is also closely related to local context and population – new large wind farms are currently being integrated into low population areas which may not need high levels of engagement and benefit-sharing. However, as Australia changes its existing generation portfolio to include greater levels of renewables, more populated areas will also be host sites which will add complexity to the developments.

However, none of this is to say that communities will not support large turbines or large wind farms. Interestingly, the CEP analysis did not show a correlation between a large, more visible wind farm and community anxiety or objection. In fact, one wind farm CEP reviewed had no objections although it was very large and situated on top of an extremely visible ridgeline. This indicates that it is possible for a wind farm to be both highly visible and highly supported, given the right conditions, which includes having undertaken locally-appropriate and quality community engagement.

Timeline

Many interviewees recognised the difficulties associated with long timelines and unpredictable planning processes associated with wind farm development. Often, the development process can span years and projects may sit dormant for a number of years, waiting for finance, power purchase agreements or the right policy environment. This causes a number of challenges for community engagement and benefit-sharing. Ideally engagement will begin during feasibility and continue throughout all stages of a project. This requires investment of staff time as well as funding for community engagement activities. Interviewees also expressed the importance for benefit-sharing to start before construction (when the most disturbance and change occurs in the community), although challenges exist at this point as the project has no income, and definitely before operations. This has monetary and pragmatic impacts on developers, which can be challenging.

Early engagement was strongly recommended by all panellists, who cited the benefits they had experienced or observed. Some defined 'early' as starting immediately after feasibility studies have proved the site to be viable and run concurrently with the detailed planning studies required. This stage enables discussion and input ahead of the planning application, but is not too early that uncertainty unsettles stakeholders, or 'champions' become fatigued in their support. The panellists also provided advice regarding engagement during the wind farm construction stage. This included describing effective, accessible (non-technical) information around timelines of development, truck movements and times, contact details and mechanisms receiving regular updates and lodging complaints and questions. Such information can be delivered through SMS mobile phone alerts, regular website updates and mail-outs, newsletters and/or media stories – ideally in liaison with local government, as well as ongoing face-to-face contact.

The people factor

The CEP analysis reflected that community engagement is no longer seen as 'nice to have', but rather an extension of the company's values and a valuable part of the development process. This was demonstrated by actions to embed community engagement staff in a range of teams within the company.

In the survey, more than half of the respondents indicated that their company has dedicated community engagement staff. However, this is usually less than 1 FTE – a surprising result given more than half of respondent are companies with more than 20 FTEs in total. In half of the survey respondents' companies, staff responsible for community engagement look after three to four projects each, while 37 per cent of respondents indicated that they have one community engagement staff per project. The majority of respondents (58 per cent) indicated that staff involved in community engagement roles live in the wind farm development area.

ESTABLISHING TRUST WITH THE COMMUNITY

Trust is emphasised in the literature as well as throughout the four source documents as a keystone for achieving positive community engagement and associated social outcomes. From the interviews, specific factors that were seen to influence trust included:

There is a notable lack of specific community engagement training among community engagement staff. Of the community engagement staff who responded to the survey, the majority have on-ground experience, and 25 per cent have received specific training or qualifications related to community engagement. However, it was more common for respondents to have formal qualifications in communications than community engagement, indicating the common overlap, or confluence, of the two areas of work. Some respondents have completed short courses (e.g. industry seminars) in media, community engagement, negotiation, complaints management or conflict resolution. Consultants have the highest rate of training and specific qualifications in community engagement, but still this is low, at 44 per cent.

Beyond the formal training (or lack thereof), the source documents identified a range of personality styles and traits that were found to be very effective in enhancing community engagement. Having appropriate people in community-facing roles came up as a recurrent theme in interviews. The right person was identified as crucial to helping build lasting relationships and trust, which are an asset for the project in building support, negotiating acceptable solutions and discussing concerns. The importance of being able to listen and ensure people feel heard is fundamental to community perceptions that a development process has been fair. This appropriateness of community-facing staff and consistency of staff over time, as well as their willingness to engage with local people face-to-face and in one-on-one as well as a group setting was identified as being of fundamental importance.

Many interviewees cited that an ideal community engagement representative of the wind developer would be a local person with a rural background, specific training and certain personality characteristics. The desirable characteristics included being a good listener (empathetic, patient), being humble and honest, and being dependable and trustworthy. There was a recognition that many of these traits come down to personality, but that they can also be developed over time through mentoring and training. Another approach was to pair staff during community engagement, so a range of skill-sets and knowledge are present.

Be available to the community

Providing regular and consistent contact with the local community, particularly hosts and neighbours. Having staff available to the community and able to commit time to developing relationships and being responsive to community interest and concern. The appropriateness of community-facing staff and consistency of staff over time were key to success.

Offer access to decision-makers in the company

Ensuring community-facing staff have some delegation of authority to be able to address people's questions or concerns, rather than always having to defer to someone with more seniority. People want to know they are talking to someone with a degree of power who will take them seriously.

Engage early, in many settings and both informally and formally

Initiating early engagement with local people (beyond hosts) during the feasibility stage. Conducting engagement and consultation via individual and group settings. This includes convening meetings involving hosts and neighbours from early in the project design process. Providing formal (e.g. meetings, information sessions) and informal (e.g. casual encounters in the street, BBQs) opportunities for interaction. This relates to having staff based locally and making an effort to integrate into the local community.

Tell the truth

Being honest about potential negative and positive impacts, and what to expect during all phases of project development including the difficulties of uncertain or changing timelines and project scope.

The panellists responded to the above findings regarding staffing and organisational 'culture' with comments that indicated that a 'cultural change' has already occurred. They identified that this change had been driven by reverse auction requirements (e.g. in the ACT), previous experiences of community opposition, planning instruments (such as in NSW) and other mechanisms and events. The panellists also outlined four initiatives to continue this process of culture change:

- **Promote positive examples**
  Publicise wind farms with strong community engagement processes at industry events. This could act to raise expectations of best practice community engagement.
- **Expose cost-benefits of engagement**
  Financially quantify the benefits that come from positive community engagement practices, as well as the cost and reputational risk of not doing so.
- **Change organisational structure**
  Develop an integrated organisational model to secure and maintain a social licence to operate, and that is clearly driven and supported by senior management.
- **Provide training in community engagement**
  Such training could include skills in community engagement and community development, public speaking, active listening, negotiation, models for participation and evaluation, and conflict resolution, and could be provided to a range of levels of staff within wind development and prospector companies.

One CEP uniquely included a risk analysis of the cost of negative outcomes from community engagement. The impact of poor engagement was estimated at around $3.5m and carried the potential to delay the project by at least 36 months. This resulted in the company adopting a new approach to their engagement process, by investing in significant staff time for face-to-face engagement with a very clear plan and strategy for both engagement and benefit-sharing.

The value of face-to-face engagement

The activities or tools of engagement are varied across Australia, according to the CEP analysis. However, where engagement has resulted in few or no objections to a proposed development there seems to have been a focus on personal engagement that is largely face-to-face – either one-on-one with wind farm hosts and neighbours and/or with a small group of community members. This was a common theme, no matter how big or small the project was, or how visible.

In CEPs that focus on face-to-face engagement (that included one-on-one, group meetings, neighbourhood meetings, a local representative and/or regular visits by a company representative) and that clearly define the avenues for the members of the community to make decisions or to have input into decisions, there appears to be evidence of less anxiety in communities and less objections/more support. The results are that these projects included very high community support which was shown through letters of support, no opposition and no negative press. This result has been demonstrated not only in new projects where early engagement has taken place, but also in one example where this was the approach taken more than ten years after a permit had been granted. The result of this engagement approach, as reported in the CEP, was 100 per cent satisfaction from the community members determined through an independent evaluation process.

Face-to-face community engagement can occur at both an individual level as well as a group level. The interviews revealed that, in general, face-to-face techniques included door knocking, drop-in information sessions, having locally based staff, (short-term) shopfronts, tours, open days, group meetings and events. The survey results indicated some divergent views on whether face-to-face in an individual context is enough, or if group settings (allowing for discussion, deliberation, negotiation and transparency) also need to be present for face-to-face to be most effective. These included group contexts and opportunistic interactions (e.g. through participating in local events, having local staff or holding drop-in information sessions during the planning and approvals phases). Hosting wind farm tours and events have education and relationship-building benefits.

When managing complaints, the surveys identified that the majority of wind developers seek to respond to new complainants with a face-to-face meeting or visit. Few respondents preferred using email as the only means to respond to new complainants. CEP analysis revealed that technology (e.g. websites, social media) is being used widely to provide information. However, in the plans with the best outcomes in community engagement, it is the face-to-face focus of the engagement and lower reliance on technology which is creating strong relationships and delivering positive outcomes.

The interview outcomes indicated that engaging at a group level provided a sense of transparency and openness, rather than secrecy and suspicion. As many interviewees noted, people in a community will talk to each other anyway, so transparency up front is more effective for positive outcomes. Community, expert and some developer interviewees identified that it is particularly important for hosts and neighbours to be engaged as a group. This was seen as being different from public meetings through being a smaller, defined group of people with clear logics for who should attend and how they can participate (e.g. providing input on specific things).

Community influence on wind farm decisions and designs

The survey respondents commented that to be successful, engagement needs to go beyond information provision to include opportunities for community influence in project design and/or a role in decision-making. However, they also warned that token efforts at engagement, where community input is sought but decisions are not genuinely open to change, can be very damaging. In response, the extent to which companies have been able to provide communities with decision-making opportunities varies. The CEP analysis found that enabling some level of decision-making regarding the wind farm layout and turbine numbers is likely to be determined by a number of physical, economic and social factors. The survey and interviews recognised that including the community in design and decision-making is sometimes impractical or is limited by commercial/technical viability and that these boundaries need to be clearly defined and managed.

Despite the challenges, most companies were able to identify areas for the community to make decisions regarding projects. The CEP analysis suggested activities for community involvement and influence could include traffic routes for construction; some influence on turbine numbers and location; the benefit-sharing program (the design and type of program, how funds are shared and who benefits); and how engagement is conducted, with whom and how often. The survey found that it was most common for developers to have changed the siting of individual turbines (39 per cent) or to have removed turbines from the project (22 per cent).

Community input had informed the design and/or distribution of benefits from the development in three cases (16 per cent). Other aspects mentioned by respondents as having changed in response to community feedback include: location of access road and transmission lines; landscaping and vegetation screening; informing flora and fauna studies, or doing more studies; and agreement to turn off turbines during aerial spraying, if required.

A very specific forum for community decision-making that was often mentioned in the CEP analysis is the use of a Community Consultative Committee (CCC) (or similar titles). This is the result of NSW legislation passed some years ago requiring them to be implemented, however similar committees are used for wind farms in other states. CCCs aim to represent a cross section of the community and are being utilised to share information, increase contact with the wider community and make decisions about aspects of a project such as a community grant program.

The CEP analysis collated the features of best practice CCCs from the developers who had conducted them. Features included:

- **Representation**
  Having broad community representation of local stakeholders and demographics.
- **Processes**
  Having a trained facilitator; clear terms of reference that include deliberation and input/ advice on aspects of project design and benefit; and meeting from the early stages of project planning through the entire life of the project, with the regularity of meetings adjusted to the project stage.
- **Transparency**
  Having publicly accessible and comprehensive minutes of meetings and decisions; clear processes of regular reporting back to this group, and the broader community; and clear means for how positions on the committee are appointed and how people can apply, preferably through a democratic process.

The panellists shared their views on how to avoid CCCs becoming a platform for general debates regarding wind farms, and become an unproductive forum. This advice confirmed the above features. In addition, the panellists recommended all costs being covered, including a good meal following the meetings, and ensuring involvement by a wind developer representative who is constructive, robust and not defensive and a representative from the relevant government department to enable a three-way conversation between the community, developer and regulator.

There was no evidence provided in the CEPs that there is a correlation between the implementation of a CCC (or similar) and a consistently successful community engagement outcome. Although, one project cited in the CEP analysis that achieved very positive community engagement outcomes had implemented a variation on a CCC which was more inclusive but also more informal to influence the design. They invited all people within the neighbourhood of the wind farm to participate in regular meetings with the developer and project hosts. Through these meetings, the developer received input on key decisions and reported back the outcomes of this input, as well as building relationships and trust.

Four survey respondents raised negative experiences with CCCs, as legislated in NSW, having found them to be counterproductive to good engagement. Their concerns included the difficulties of forming a CCC that was genuinely representative of the community and not dominated by personal or political agendas; was effective as a conduit of information between the community and the developer and vice versa; and that had a clear role within the project development process. The combined analysis suggested that the success of CCCs depends on when it is implemented, how membership is appointed, what its remit is and how it can change the dynamics in the community.

The scope for which community stakeholders can influence wind farm designs received mixed comments from the panellists, with some developers concerned that a lack of renewable energy project development knowledge would result in unfeasible decisions. However, others saw opportunities for opening decision-making on non-technical aspects that were community-oriented – predominantly the access to site and construction transport routes; the structure of shared benefit schemes and the use of community investments; off-site landscaping plans such as the design of screening for substations; and viewing platform locations. Where possible, some offered that the community could also provide early input into area mapping to identify any sensitive micro-siting areas in the development. There is also scope for community involvement to inform the CEP and evaluation of engagement and benefit-sharing activities.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BEST PRACTICE BENEFIT-SHARING

When considering whether benefit-sharing should be offered, the panellists proposed several aspects that should be assessed, such as the motivations or concerns of the community regarding the proposed wind farm, the number of neighbouring landholders and the proximity of their homes to the wind turbines.

When the panellists were asked whether a 'best practice benchmark' for benefit-sharing was possible to identify, their responses were mixed as the wind farm sizes, governance and approaches to benefit-sharing can be so diverse. They also held a concern that setting an explicit benchmark (or legislation) could limit future improvement and diversity, and also appear to recommend one scheme structure as the 'silver bullet'.

Instead, they proposed several features that they considered were crucial to a best practice benchmark. These included:

- **Be willing to negotiate**
  Neighbour and community benefit schemes are one of the few parts of a project that can be up for influence and negotiation with the local community.
- **Be fair**
  As community members living closest to projects can experience the greater impacts, they should receive the greatest benefits. Strike a balance that is seen to be a fair split between how much the host benefits versus how much neighbours and the broader local community benefit.
- **Be ongoing**
  Benefits should be provided during the operational phase. One-off payments or payments only during the shorter construction period do not provide ongoing sustainability or support.
- **Be a true benefit**
  Don't be provided with conditions of silence.
- **Be part of a broader strategy**
  This involves community participation and local community development.

Furthermore, the panellists noted that the particulars of the project, especially the capacity factor, financing and legal structure, will limit or influence the appropriate model for each community. The above criteria could also be adapted to evaluate the impact of the benefit-sharing initiatives. Panellists also suggested additional evaluation criteria regarding the long-term sustainability of the benefits in the local community, and the increased positive profile or reputation of the company or project. It is also important to note that benefit-sharing does not necessarily need to involve yearly cash payments; it can also involve local in-kind and partnership benefits, as detailed below.

The subsections below on benefit-sharing detail several types of sharing schemes that were considered and discussed in the four source documents.

Grant programs and broader benefit-sharing

Community grants, also called community funds and benefits funds, are common in many communities hosting wind farms within and outside of Australia. The literature revealed that these vary in focus, scale and governance. The CEP analysis identified that, in Australia, these grants and funds often exist to provide some form of financial support to local community groups. There have been a variety of structures implemented – including sponsorship of clubs, community grant funds and scholarships. Of the few CEPs that detailed the amount of funding available, this ranged between AUD$500 – $1,500/MW per year for large-scale commercial wind farms, and between AUD$6,000 – $8,000/MW per year for community-owned wind farms. One panellist described the financial contribution to two NSW communities of AUD$500,000 per year for the life of the wind farms as being well-received by many community members as a long-term opportunity.

A key aspect of successful community grant funds was that the community determines the role it plays in the delivery of the fund (Ernst and Young, 2015). The Australian experience, revealed in the CEP analysis, identified the variety of ways that the decision of how to disseminate the money is determined: partial community decision making, full community decision making or involving a trusted third party organisation (e.g. local charity, local government). The CEP analysis did not identify any correlation between having a community fund and a satisfied or accepting community (there was a general lack of evaluation in the CEPs), but the presence of such funds does seem to be responding to a community expectation of some broad benefits to the area hosting the project – similar to the expectation that the wind farm will bring local job creation. Across the four source documents, there was overall support for community grant funds, however, some criticisms in their distinct application in terms of amount, who controls the funds, who make decisions about their allocation and who benefits. It was also noted that in some communities, a community fund may not be an appropriate approach, perhaps due to the low local population or existing (or lack of) local foundations. Each community context is variable and the desire for participation will therefore also be variable.

If a grant or fund program is implemented, the four source documents identified key aspects for best practice:

- **Align with broader, longer-term local and sustainable development initiatives**
  For community funding, long-term strategic benefit programs are an increasing trend. These may be targeted to in-need or at-risk populations, or have a particular focus such as more local energy production (WISEPower Consortium, 2015). These can tie in with locally-identified development agendas for the future sustainability and vitality of the community. Applying a meaningful longer-term strategy that is community led and collaboratively designed will lead to better outcomes.
- **Be generous, clear and transparent and base the funding amount on MW capacity (not per turbine)**
  It is recommended that companies think creatively about how community benefits are designed and delivered. Financial contributions should be considered in line with project capacity (i.e. $ per MW), rather than turbine numbers (due to the differences in power of installed turbines), and be developed collaboratively and cooperatively with communities. In the same way that there is no one size fits all approach to community engagement, benefit-sharing should also be developed to respond to the specific community. There are a range of activities that could be considered under this, which may not be a grant program. Financial contributions vary markedly from project to project, and ranged from AUD$500 to $8,000 per MW of installed capacity across the 30+ projects reviewed in this project.
- **Separate from sponsorship program**
  Community benefits should not be instead of a sponsorship program. But again, financial benefits of any kind should be designed collaboratively with the community.
- **Be independently governed by the local community**
  This can be facilitated through a purpose-made organisation, an existing trusted community charity or foundation, a community board (with local council representation), the Community Consultative Committee (if well-governed) or by residents living within a specified radius of the turbines. Such a local committee would oversee the grant guidelines and process for application to ensure suitability for local priorities and circumstances, even if they do not formally hold and distribute the funds.

Neighbour payments

A recent initiative in Australia's wind industry has been a form of benefit-sharing that provides a direct financial benefit to neighbours of a project. This was introduced in reflection of the high incomes (anywhere up to AUD$15,000/turbine/year) paid to Australian turbine hosts. Providing a financial gain to nearby neighbours can act as recognition that (apart from hosts) they are most impacted by the visual and potential audio (sound) impacts. It can also assist to resolve the conflict that can occur between landowners and neighbours regarding the distribution of benefits. Neighbour benefits can reduce community conflict between the 'haves' and 'have-nots' of wind development by sharing benefits more broadly and fairly.

The CEP analysis justified neighbour benefits as a means to share the benefits of a wind development more evenly amongst those geographically nearest to it, in an attempt to increase the perception of fairness in terms of how the financial benefits from the development are distributed. Distribution to neighbours can be implemented per acre within a set distance from a turbine, or simply per landholder within a certain distance.

Both the CEP analysis and the survey revealed a number of risks with providing financial benefits to neighbours: if this was perceived by others (non-recipients) to be unfair; if it occurs through private negotiations (in secrecy); or if it emphasises a compensation rationale (rather than a benefit-sharing rationale). To counter these risks, it was recommended that the wind developer's decision regarding payment amounts and recipients are informed by deep local consultation, ideally involving group meetings between neighbours, hosts and the developer or a community organisation.

The panellists were undecided regarding whether neighbour payments were a useful precedent – considering that larger industrial, residential and mining developments do not provide such payments. Instead, some panellists proposed offering neighbours the opportunity to host wind farm-related infrastructure such as turbines, roads, sub stations and powerlines. However, this option obviously has its limits as the project boundary will always be drawn somewhere. They advised that, whichever neighbour payment or activity is established, they must be provided early in the development and in a transparent manner that does not risk being perceived as 'bribery', but rather to reinforce other community engagement initiatives.

Other neighbour benefits

Benefit-sharing, particularly with wind farm neighbours, can extend beyond (or in addition to) annual financial payments. In Australia, these have included free home insulation, energy audits and subsidised solar hot water (Ernst and Young, 2015). Other energy-related benefits suggested in the source documents included energy bill contributions; installing solar panels and/or batteries; and ensuring the neighbourhood with closest proximity to the turbines are a priority area for a community grant fund (if implemented).

Co-investment and co-ownership

Working with the community to create co-ownership or co-investment opportunities is an initiative that several Australian wind developers are considering but few have yet been actioned. This includes:

- **Offering an opportunity for local people to invest in the wind farm** by purchasing shares or bonds, and setting a low enough minimum entry (e.g. AUD$1,000) to allow people to participate, while also being administratively practical.
- **Providing a gift of equity** in the project to near neighbours (e.g. offering AUD$1,000 worth of equity to each household within 2.5 km).
- **Partnering with a local group** (e.g. a cooperative) to facilitate co-ownership of a portion of the wind farm.

Regardless of whether this equates to a significant level of community ownership or control over the wind farm, it does create a strong local connection with the wind farm and a sense of emotional ownership ('psychological attachment'). There is extensive research indicating that local co-ownership or co-investment is a successful way to increase local support for a wind development, through increasing people's connection with, knowledge of, participation in and benefit from the development (Warren and McFyden, 2010; Hindmarsh, 2010; WWEA, 2016; WISEPower, 2016; Devine-Wright, 2011; Bell et. al, 2013; Bridge et. al, 2013; Walter, 2014; Haggett, 2011; Munday, Bristow and Cowell, 2011; Ernst and Young, 2015). Some survey participants considered that opening the wind farm to local ownership or investment should be mandatory.

The data did not reveal the reasons for the low take-up co-investment by companies, despite their stated interest. The reasons may be numerous, including unfamiliarity and the changes required to legal, financing and security structures of the project. However, it was beyond the scope of this study to research barriers or challenges to co-investment approaches in Australia.

Partnerships and local contractors

The construction stage of a wind development offers a means by which local contractors can receive significant work contracts and a developer can support locally-based employment. The literature review identified that, with regard to local content during the construction phase and if the Engineering, Procurement and Construction contract allowed for it, that the local industry is informed of the development, and that larger contracts are potentially broken up to enable participation by smaller, local contractors. The interviews raised construction as a phase of particular importance in community engagement, as this is when local people will experience the highest levels of change and disturbance (e.g. traffic, noise). Opportunities associated with construction include partnerships with local trades and schools to deliver education programs, as well as open days to help de-mystify the construction process and the technology. Despite being identified as a sensitive period in project development, however, the surveys indicated that developers, in general, plan the least level of community engagement during this stage. This is a current weakness in wind development practices.

The four source documents indicated that local construction industries are already gaining benefits from Australian wind farm development. The CEP analysis revealed that many wind developers are explicitly targeting local contractors through specific actions such as creating an online database of local contractors. Some developers convene business roundtables to brief local contractors on their future needs and provide them with sufficient lead-time to respond to tender opportunities. Some developers have worked with local businesses to increase the skills and capacity of local staff to perform required services. Additionally, some developers have sought to purchase Australian-made wind infrastructure, such as towers, transformers and cabling.

Beyond current practice, the source documents included suggestions to create partnerships with training organisations to provide opportunities for apprentices or for upskilling of the workforce. The panellists responded to these findings by noting that the use of local business during the construction phase can make the economic contribution of the wind farm development explicit to the region and communities.

OTHER BENEFIT-SHARING OPTIONS

Additional benefit-sharing initiatives from outside Australia emerged from the literature review and from interviews:

- **Housing market certainty**
  An emergent issue in the literature on wind farm development is the mitigation of housing market anxiety, often from neighbours to wind farm projects. Internationally, some developers have bought the homes and then resell them or offer a bond in order to guarantee the property value for when the owner wants to sell. If it is sold for less than market value, the bond will subsidise the transaction (Fast & Mabee, 2015). Research has shown wind farms do not have any long-term impact on property prices,
  although the market can be suppressed during the construction phase.
- **Landscaping as visual screens**
  The compliance requirements of landscaping at a wind farm often involves screening and planting trees. Beyond compliance, a shared benefit can be ecological offsetting or enhancement.
- **Tourism**
  Developing tourism or visitor facilities for the renewable energy projects, such as viewing platforms and educational programs and tours, are increasingly occurring (Munday, Bristow, & Cowell, 2011). Panellists mentioned that the tours could provide a business opportunity for local bus or tour operators, while reducing the resources required from the wind farm.
- **Local infrastructure upgrades**
  Using opportunities associated with the wind farm to improve local roads and telecommunications,
  for example.

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